

REMARKS

This Amendment is in response to the Office Action dated June 7, 2004. In the Office Action, the Examiner rejected claims 10-15, 32-35, 53-56, and 77-79 under 35 U.S.C. § 102(e) as being clearly anticipated by Hendricks et al., U.S. Patent No. 6,160,989 (hereinafter *Hendricks*). Claims 14-15 and 36-37 were rejected under 35 U.S.C. § 103(a) as being unpatentable over *Hendricks* in view of Graves et al., U.S. Patent No. 5,410,344.

Claims 10, 11, 13, 32-37, 53-56, and 77 are amended as shown above. Specifically, independent claims 10, 32, 53, and 77 are amended to more clearly recite features of the claimed invention. Claims 10-15, 32-37, 53-56, and 77-79 remain pending in the application. For the reasons set forth below, the Applicant respectfully requests reconsideration and allowance of all pending claims.

ARGUMENT IN SUPPORT OF ALLOWANCE OF THE AMENDED CLAIMS

Claim Rejections - 35 U.S.C. § 102

A claim is anticipated only if each and every element of the claim is found in a single reference. M.P.E.P. § 2131 (citing *Verdegaal Bros. v. Union Oil Co. of California*, 814 F.2d 628 (Fed. Cir. 1987)). "The identical invention must be shown in as complete detail as is contained in the claim." M.P.E.P. § 2131 (citing *Richardson v. Suzuki Motor Co.*, 868 F.2d 1226 (Fed. Cir. 1989)).

With respect to the rejection of independent claim 10, as originally filed, the Examiner states,

Referring to claim 10, *Hendricks* discloses receiving content descriptors, which describe content, from a server (see Column 7, lines 15-17, 21-24 and 65-67 and Column 8, Lines 1 and 44-48 for receiving menu data fro programming transmitted from the server).

Hendricks also discloses generating demand data related to the content described by the content descriptors (see Column 17, Lines 39-42 for generating a subscribers program access history (demand data) status report).

Hendricks also discloses sending feedback to the server after demand data is generated related to a first amount of content (see Column 17, Lines 49-57 for sending the status report from the set top box to the network controller (server)).

Hendricks concerns a "Network Controller for Cable Television Delivery Systems." More specifically, as stated in the abstract, *Hendricks* discloses,

A novel network controller for use with a digital cable headend capable of monitoring and controlling set top terminals in a television program delivery system is described. The invention relates to methods and apparatus for a network controller that manages a configuration of set top terminals in a program delivery system. The invention is particularly useful in program delivery systems with hundreds of channels of programming, a menu driven program selection system, and a program control information signal that carries data and identifies available program choices. Specifically, the invention modifies a program control information signal at the cable headend before the modified signal is transmitted to each set top terminal. This signal is used with polling methods to receive upstream data from the set top terminals. The invention initiates such upstream data retrieval, gathers all data received and compiles viewer demographics information and programs watched information. The invention processes this data and information to generate packages of advertisements, as well as account and billing reports, targeted towards each set top terminal. The invention uses upstream data reception hardware, databases and processing hardware and software to accomplish these functions.

Claim 10 has been amended to more clearly recite features of the claimed invention, and now recites:

10. A method, comprising:
receiving, at a client, content descriptors, which describe content, from a server;
generating demand data related to the content described by the content descriptors;

sending demand data feedback from the client to the server after demand data related to a ***predetermined amount of content is generated***. (Emphasis added)

Details regarding receiving information that is sent from set top terminals under *Hendricks* is described at the section entitled "6. Receiving Information from Set top Terminals," beginning at Col. 24, line 25 The first portion of this section concerns how

(i.e., from a transmission standpoint) the communication is performed. Subsequently, there is a discussion concerning under what conditions the data is received from the set top terminals (i.e., what triggers the sending of the status data). The preferred embodiment is to use polling, wherein the set top terminals are polled by the network controller. Random access and telephone modem schemes are also disclosed. Applicant respectfully asserts none of these schemes disclose or fairly suggest "sending demand data feedback from the client to the server after demand data related to a ***predetermined amount of content is generated.***"

More specifically, *Hendricks* states,

Upstream information received from the set top terminals 220 typically includes, for example, program access data gathered at each set top terminal 220. *Such information may be communicated to the network controller 214 through a variety of methods including any of the following methods: (1) cyclic polling, (2) random access, and (3) telephone modems.* Cyclic polling and random access methods make use of the two-way RF system diagrammed in FIGS. 9a and 9b, described above.

As described below, the preferred embodiment employs a cyclic polling method. Although various polling schemes will work with the present invention, a roll-call polling scheme is preferred over other schemes such as hub polling or token-passing since roll-call polling provides the greatest degree of centralized control.

Using this preferred method, program access information is stored at each set top terminal 220 until it is polled by the network controller 214 for information retrieval using a polling request message format 920 as shown in FIG. 10a. (Col. 25, line 62 – Col. 26, line 13, emphasis added.)

Clearly, under the preferred polling technique, the retrieval of program access information is managed by the network controller, with no aspect being controlled by the set-top terminals. Furthermore, the program access information that is returned is irrespective of demand data related to a predetermined amount of content. In fact, *Hendricks* clearly teaches away from sending demand data related to a predetermined amount of content. More specifically, *Hendricks* employs a variable length information field so the status of an indeterminate number of programs accessed can be included in the status message containing viewer history information:

FIG. 10b shows an example frame format 920' for the status reports received from the set top terminals 220 during the polling cycle. This frame format is substantially identical to the polling request message format 920 (FIG. 10a), and includes: (1) a leading flag at the beginning of the message, (2) an address field, (3) a subscriber region designation, (4) a set top terminal identifier that includes a polling command/response (or P/F) bit, (5) an information field, and (6) a trailing flag at the end of the message, each designated by a common number with respect to FIG. 10a, but with the prime indicator (') added.

Again, the information field 932' remains variable in length so that the status of an indeterminate number of programs accessed, as represented at 933', can be included in the frame. In this way, the control message length of the polling request message is minimal since the network controller 214 does not transmit such access information. After a polling response by a given set top terminal 220, however, the control message length increases in proportion to the number of programs accessed. (Col. 27, lines 31-50, emphasis added.)

The second method for receiving information from the set-top terminals is random access. As disclosed by *Hendricks*,

The second method for the network controller 214 to receive information from the set top terminals 220 is through the use of a random access scheme. In an alternate embodiment that uses this method, individual set top terminals 220 can send control-related messages to the network controller 214 without being polled. This scheme is particularly useful in networks where subscriber regions include potentially large numbers of subscribers. High concentrations of subscribers may be found, for example, in large metropolitan areas. In such cases, the polling cycle can be replaced with a more sophisticated random access strategy such as carrier-sense multiple access with collision detection (CSMA/CD). In this scheme, each set top terminal 220 must "listen" before it transmits and then does so only if it senses an idle medium. When the return link to the network controller 214 is silent, a given set top terminal 220 can transmit its messages. *Any messages sent from a set top terminal 220 to the network controller 214 would set the P/F bit 930' to a "0" position to indicate that the message is not in response to any command or polling request.* In addition to CSMA/CD, other random access schemes can be used with the system, such as CDSL. (Col. 27, line 64 – Col. 28, line 18, emphasis added.)

Clearly, there is no mention whatsoever of when or under what condition a given set-top terminal would send status data to the network controller. In fact, the foregoing passage suggests the same message format (shown in FIG. 10b and discussed above)

used in the polling scheme would be used for the random scheme, supporting a situation where the amount of content for which status data were provided would be indeterminate. Accordingly, no reasonable argument can be supported that the *Hendricks'* random access scheme teaches or fairly suggests the element of "sending demand data feedback from the client to the server after demand data related to a ***predetermined amount of content is generated.***"

With respect to the third method for receiving data from the set top terminals via telephone modems, *Hendricks* discloses,

The third method for the network controller 214 to receive information from the set top terminals 220 is through the use of telephone modems. In an alternate embodiment, the set top terminals 220 communicate program access information and orders to the network controller 214 using telephone modems. In this embodiment, the set top terminals 220 are equipped with a modem port to facilitate such operation. Thus, communications between a given set top terminal 220 and the network controller 214 can be established over telephone lines when cable traffic or other primary traffic is congested. The preferred method of using telephone modems is in combination with a control or "hit" signal from the network controller 214. A group (or region) of set top terminals 220 is "hit" simultaneously by the network controller 214 via the cable. Only those set top terminals 220 within the group that have data for the network controller 214 call the network controller 214 by modem. The network controller 214 is equipped with a bank of modems (organized to roll-over telephone calls) to answer the incoming calls. (Col. 28, lines 19-38.)

As with the other schemes, the telephone modem scheme provides no teaching or fair suggestion of the element of "sending demand data feedback from the client to the server after demand data related to a ***predetermined amount of content is generated.***" Rather, under the preferred method, the set top terminals send status data back to the network controller in response to a control or "hit" signal, indicating that occurrence of when and under what condition status data is sent is under control of the network controller.

Finally, with respect to the aforementioned schemes for receiving information from the set top terminals, *Hendricks* states,

Among the three methods discussed for the network controller 214 to receive information from the set top terminals 220, the use of the cyclic polling scheme depicted in FIGS. 10a and 10b, is preferred. Polling is preferred because it allows the network controller 214 to conduct and control communications with set top terminals 220 over the cable network in an orderly fashion. In particular, the network controller 214 can schedule data retrieval by polling the set top terminals 220 one by one. A random access method, on the other hand, does not allow the network controller 214 to maintain such orderly communications. Instead, the network controller 214 receives data from the set top terminals 220 at random, depending on when the cable medium is idle. This random reception of data lessens the degree of control that the network controller 214 has over set top terminal transmissions. Likewise, the third method, which uses telephone modems, is less desirable than the polling method since the use of modems does not allow for upstream interactivity over the cable medium. (Col. 28, lines 39-57, emphasis added.)

Clearly, the foregoing indicates the polling method is preferred because it allows the network controller to control when communications with the set top terminals occur, and how those communications are handled. This is opposite to the method recited by claim 10, wherein communication of the demand data is controlled by the clients in response to the generation of demand data relating to a predetermined amount of content.

In view of the foregoing arguments, it is clear that amended claim 10 is patentable over the cited art. In addition, each of claims 11-15, which depend from claim 10, are patentable for at least the same reasons.

With respect to independent claim 32, this is a Beauregard (*i.e.*, machine-readable medium) claim that has been amended to recite elements analogous to those contained in method claim 10. Accordingly, independent claim 32 is patentable over the cited art for analogous reasons to those presented above in support of the allowance of claim 10. Furthermore, each of claims 33-35, which depend from claim 32, are also in condition for allowance for at least the same reasons.

With respect to independent claim 53, this is an apparatus claim that has been amended to recite an apparatus for performing operations analogous to the method

operations recited in claim 10. Accordingly, independent claim 53 is patentable over the cited art for analogous reasons to those presented above in support of the allowance of claim 10. Furthermore, each of claims 54-56, which depend from claim 53, are also in condition for allowance for at least the same reasons.

With respect to independent claim 77, this is an amended system claim defining operations involving a server coupled to one or more clients, wherein the clients perform operations analogous to the method operations of claim 10. Accordingly, independent claim 77 is patentable over the cited art for analogous reasons to those presented above in support of the allowance of claim 10. Furthermore, each of claims 78 and 79, which depend from claim 77, are also in condition for allowance for at least the same reasons.

With further respect to claim 32, it is noted that originally-filed claims 36 and 37 are claims that depend from claim 32, but were withdrawn in view of a prior restriction requirement. Accordingly, the applicant requests that claims 36 and 37 be reinstated if claim 32 is found to be in condition for allowance.

Overall, none of the references singly or in any motivated combination disclose, teach, or suggest what is recited in the independent claims. Thus, given the above amendments and accompanying remarks, independent claims 10, 32, 53, and 77 are now in condition for allowance. The dependent claims that depend directly or indirectly on these independent claims are likewise allowable based on at least the same reasons and based on the recitations contained in each dependent claim.

If the undersigned attorney has overlooked a teaching in any of the cited references that is relevant to the allowability of the claims, the Examiner is requested to specifically point out where such teaching may be found. Further, if there are any informalities or questions that can be addressed via telephone, the Examiner is encouraged to contact the undersigned attorney at (206) 292-8600.

Charge Deposit Account

Please charge our Deposit Account No. 02-2666 for any additional fee(s) that may be due in this matter, and please credit the same deposit account for any overpayment.

Respectfully submitted,

BLAKELY, SOKOLOFF, TAYLOR & ZAFMAN

Date: Sept 7, 2004

R. Alan Burnett
R. Alan Burnett
Reg. No. 46,149

12400 Wilshire Boulevard
Seventh Floor
Los Angeles, CA 90025-1030